

Health Services Cost Review Commission 4160 Patterson Avenue Baltimore, MD 21215 (410) 764-2605

April 4, 2007

The final recommendations include modifications made following the March 7, 2007 presentation of draft recommendations to the HSCRC. These final recommendations are ready for Commission action.

Health Services Cost Review Commission Recommended Update to the Nurse Support Program I

I. Introduction

This paper includes a summary of the history and initial five-year experience of the Nurse Support Program I and recommendations for updating the program. Categories eligible for funding, application process, the funding mechanism and standardized reporting are addressed in the recommendations.

II. Background

The HSCRC initiated nurse education support funding (formerly titled the Nurse Education Support Program or NESP) in 1986 through the collaborative efforts of hospitals, payers, and nursing representatives. Originally, the NESP focused on supporting scholarship support for college and hospital-based training of Registered Nurses (RNs) and Licensed Practical Nurses (LPNs). Over the years, the NESP expanded to encourage new and innovative approaches to address the challenges and demands facing the nursing profession and allied professions. Thirty-seven hospitals participated in the NESP from 1986 through 1995 when the program concluded. Over \$7 million was allocated for this program.

In July 1, 2001, the five-year Nurse Support Program I (NSP I) was instituted at the request of the hospital industry to encourage hospital-based programs aimed at addressing the short and long term nursing shortage impacting Maryland hospitals. Hospitals were eligible to receive the lesser of their budget request or up to 0.1% of the hospital's gross patient revenue for the previous fiscal year, to be provided through hospital rate adjustments, for approved projects that address the individual needs of the hospitals as they relate to nurse recruitment and retention.

III. Current Structure

To receive funding for NSP I, hospitals were initially required to submit a proposal to HSCRC which was reviewed, using preset criteria, by an evaluation committee, composed of hospital and Maryland Hospital Association representatives, and HSCRC staff. HSCRC staff evaluated subsequent proposal modifications and

renewals. Most proposals were approved, some following suggested programmatic or budgetary modifications.

Nearly all hospitals participated in the program in a variety of initiatives such as:

- Student nurse scholarships
- Internship programs
- Mentoring programs
- High school outreach
- International recruitment
- Retention initiatives

Hospitals were required to provide an annual report to HSCRC regarding NSP I program activities and budget expenses. The HSCRC provided a report format, which elicited a largely narrative response.

Over the life of the program, approximately \$36 million in NSP I funds was distributed to 50 acute care and specialty hospitals in Maryland.

IV. Rationale for review and program revisions

During the fifth year of the program, HSCRC began an overall evaluation of the NSP I. This review was prompted as part of ongoing program evaluation, because of difficulties in summarizing program outcomes and demonstrating accountability, unclear parameters for eligible program activities, emerging nursing research on best retention strategies, and the need to reconsider the scope of the NSP I program given the initiation of the Nurse Support Program II (NSP II) program in FY 2006.

While the annual hospital reports provided pertinent information regarding each hospital's activities, the largely narrative format (which was the format then requested by HSCRC) made it difficult for staff to objectively summarize the NSP program outcomes or to evaluate which program types or individual programs were most effective and efficient in achieving program goals. Inadequate quantifiable data also created challenges in demonstrating value of NSP I to the Commission, the Maryland General Assembly and the public.

Nurse educators and researchers believed that evidence was beginning to emerge regarding the value of specific types of programs in increasing retention, particularly among new graduates and new nursing hires. However, some NSP I program activities seemed to have a weak link to the goals of relieving the nursing shortage and increasing the availability of bedside nurses.

The creation of NSP II in FY 2006 and the possibility for redundancy or confusion between these two programs was an additional reason for reevaluation of the NSP I program. The NSP I program exposed the inability of nursing programs to accept large numbers of new nursing students because of limited capacity due to nursing faculty shortages. The Maryland Board of Nursing estimated that approximately 1,900 qualified students were denied admission in academic year 2003-2004 due to insufficient nursing faculty. In May 2005, the HSCRC approved funding of 0.1% of regulated patient revenue for use in expanding the pool of nurses in the State by increasing the capacity of Maryland nursing programs, developing more nursing faculty, and creating a pipeline for future nursing faculty. Under the NSP II, funding supports two types of initiatives: Competitive Institutional Grants and Statewide Initiatives. Both NSP I and NSP II included funding for nursing scholarships.

On April 12, 2006, the HSCRC approved a one-year extension of the NSP I through June 30, 2007, in order to provide the opportunity for staff to continue to evaluate and update the program to improve accountability, uniform reporting, and funding of programs with best outcomes.

V. Evaluation approach

The evaluation approach used during FY 2006 and early 2007 was to review annual reports; have informal discussions with the hospital industry, NSP I coordinators, nurse executives and educators, the Board of Nursing and HSCRC leadership; and to review current literature on the national nursing shortage. HSCRC also contracted with a nurse researcher with nationally recognized expertise on the nursing shortage to provide consultation in program review and evaluation, and assistance with development of a standardized, objective report format.

The goals of the evaluation were to:

- Improve program accountability to HSCRC and the General Assembly;
- Standardize objective program reporting, including program outcomes and financial reporting;
- Improve data available for review and evaluation of cost and outcomes of initiatives, and provide an objective basis for decisions regarding initiative renewals;
- Reduce duplication with NSP II;
- Clarify parameters of initiatives eligible for funding; and
- Improve the efficiency of HSCRC program management.

VI. Findings

There has been progress in addressing nursing shortage issues in the past five years. Nursing staff vacancies in Maryland hospitals decreased from a high of 15.6% in 2001 to a low of 9.2% in 2004. There was an increase back to a 10% nursing vacancy rate in 2005. The 2006 Maryland Nursing Program Capacity Study indicates that most recent projections reflect progress made in addressing the nursing shortage in Maryland, with more work remaining to close the projected gap between supply and demand. In their annual reports to HSCRC, NSP Grant Coordinators indicate satisfaction with their NSP I programs in addressing internal nursing shortage issues. However, due to multiple factors impacting state-wide reductions in nursing vacancies and turnover, and inconsistent NSP I program evaluation data, quantifying the role that NSP I played in these positive results is difficult.

Annual NSP I reports from hospitals followed the requested format but were lengthy, largely narrative in format, and lacked use of any standard metrics. Undoubtedly, the reports were time consuming for hospitals to prepare. Due to lack of defined metrics and emphasis on reporting of processes and activities, staff found systematic analysis of program outcomes or comparable program effectiveness difficult to complete. Due to the sheer volume of reports and other competing responsibilities, staff analysis and summary of annual NSPI reports

¹ MHA Hospital Personnel Survey.

² MHEC and MBON, Maryland Nursing Capacity Study, September 2006

fell behind schedule. Critically, there were no readily available summary data for accountability reporting to the Commission or General Assembly.

Based on the staff analysis, some general conclusions can be made about the major categories of funded programs.

High School Outreach

High school outreach programs are designed to influence high school students' perception of nursing as a potential career. Activities in these programs include hospital representatives participating in career fairs, arranging student tours of hospitals, visiting middle schools and high schools for lectures and presentations, and providing information to guidance counselors. The primary expenses reported by hospitals with high school outreach programs are salaries of full or part time coordinators and marketing. Assessing the impact of these programs has been very difficult because annual reports have often focused solely on processes or activities such as numbers of schools visited, or numbers of students that were provided materials. Better data on outcomes of outreach could be provided if hospitals reported the number of outreach contacts who become prospective nursing students participating in hospital externships, nurse shadowing or summer employment programs, or enter nursing school programs.

Scholarships or Educational Attainment

Under the current NSP I program, scholarship programs are implemented differently by each hospital. The most common aspect of the program is to provide students with funds to attend nursing educational programs in exchange for a work commitment after graduation and licensure. Some hospitals restrict funds to existing employees, some require students to work part time as nursing technicians while attending a nursing program, and others provide loan repayment funds to newly licensed nurses for a work commitment. Establishing and maintaining systems to track fulfillment of service commitment and/or loan repayment if the work commitment is not met can be a challenge for hospitals. Outcomes of these programs could be measurable if hospitals would quantify whether nursing students complete educational programs, pass

licensure exams, and fulfill the work commitment associated with the scholarship.

Because one component of the NSP II program is Statewide Initiatives which includes scholarships, there is some redundancy and potential confusion between the two programs. Additionally, since each hospital defines its own scholarship program, there may be differences in amounts of supportive funding and stipends and resultant work commitments between the hospital–based and Statewide Scholarships. While there has been some discussion of combining the two different scholarship programs, the hospital industry feels that the hospital-based programs should be continued as they meet the needs of the individual hospital. Scholarship equity and consistency would be improved by requiring that NSP I scholarship eligibility, funding amounts, and service commitments be made consistent with those of NSP II.

Another consideration is to broaden this category of funding to include all types of initiatives involving improved educational qualification for licensed nurses (RNs and LPNs) as well as initiatives to produce new nurses. This would include hospital-sponsored basic nursing education, RNs completing BSN or MSN programs, and RNs completing specialty certification. Potentially measurable outcomes include the number of individuals who complete the programs and the number who meet their employment commitments after one year.

Analyses of annual reports indicated that funds are being used for some scholarship or educational initiatives which do not seem to be congruent with the goal of efficiently increasing the number of bedside nurses in the State. These questionable categories of programs support for radiology educational technicians ultrasonographers, capital improvements to nursing workspace, celebrations and parties, and career development for non-nursing, non-clinical staff including courses in English as a Second Language (ESL), basic math and science, and GED preparation. The latter programs are created with a long range goal of preparing non-nursing, non-clinical staff to become eligible for nursing school. Nurse experts point out that funds may be better used and nursing capacity more rapidly increased if support is directed to individuals who currently qualify for entrance to nursing school rather than funding career

growth for individuals with a low probability of completion of a nursing education. Funds for traditional hospital in-service and staff development are currently available in rates.

Nurse Retention and Recruitment

The newly graduated nurse is often overwhelmed by the demands of nursing in an acute hospital unit. This phenomenon is believed to be the major reason for turnover for new and transitioning nurses. Retention initiatives include all initiatives designed to retain nurses in the hospital workplace, such as expanded orientation, mentoring, internships, and residencies. These programs often include a mentor or preceptor, drawn from existing experienced nursing staff, who acts as a resource and support to the new graduate or new hire. Some programs appoint a Chief Retention Officer to lead the retention initiative.

Retention initiatives aimed at current nursing staff include initiatives designed to improve the work environment, to increase productivity through technology, and to foster professional growth. Activities include:

- clinical certification,
- professional seminars,
- professional journal subscriptions, and
- workplace improvement design.

Retention activities have been the most difficult to assess in the past due to their diverse nature. However, impact on turnover rates is one potential objective measure of the success of retention programs.

International Recruitment

These types of programs focus on recruiting registered nurses (RNs) from other countries by establishing a relationship with international recruitment firms to recruit candidates for the program and test them to determine their eligibility. After qualified RNs are brought to Maryland, they are housed and prepared for the RN licensure exam and the Test of Spoken English (TSE). Some barriers that delay progress in practice as an RN are the prolonged immigration timeline, cultural issues, lack of a support system for immigrants, and the failure of some candidates to pass the RN license or the TSE.

Recruitment of international nurses, while important to some hospitals to meet short-term needs, presents a controversial use of NSP I funds. The reasons are because international nurses require extensive orientation and mentoring support to succeed as RNs in Maryland hospitals. Some experts also feel that international recruitment contributes to a world-wide nursing shortage affecting global health. Recruitment of international nurses seems to be a short-term solution to a long-term problem. Hundreds of eligible Maryland candidates are turned away from Maryland nursing programs due to lack of capacity in educational programs. Building Maryland nursing educational capacity appears to be a better long range use of NSP funds.

Improved nurse practice environment

Nurse experts informed HSCRC staff that more evidence is emerging that well organized orientation and mentoring programs for newly graduated and newly hired nurses offer some of the best returns in recruitment and retention strategies. Other successful programs include those that provide for an improved nurse practice environment such as seeking and achieving Magnet Status and joint governance programs. Programs providing support for educational attainment including nursing degrees and certifications also enhance nurse retention and build a more professional nursing staff.

VII. Distribution of Funds

The current mechanism for funding of the NSP I program was also reviewed during the program evaluation and alternative funding options were considered. As noted previously, hospitals are eligible to receive the lesser of their budget request or up to 0.1% of the hospital's gross patient revenue for the previous fiscal year, to be provided through hospital rate adjustments, for approved projects. After rates are increased, the revenue resides with the hospital and is expensed through the administration of its NSP I program.

HSCRC staff has contemplated pooling the NSP I funds into a centralized account to be distributed to approved NSP I programs in a fashion similar to the NSP II program administered by the Maryland

³ Maryland Nursing Program Capacity Study

Higher Education Commission (MHEC) on behalf of HSCRC. In administering the NSP II, MHEC receives funds on a monthly basis from individual hospitals based on their assessed amount (0.1% of gross patient revenue). These funds are accumulated into an account that is later distributed to approved programs.

There are advantages and disadvantages to pooling NSP I funds. The benefits include the ability to fund, in a more wide-reaching fashion, those programs which have been found to be most effective in reducing the nursing shortage and increasing the availability of bedside nurses. Other benefits of a pooling mechanism include increased accountability for funds, particularly for program and budget modifications, and for unused funds due to lack of applicants or program implementation delays. In a pooling mechanism, the unused funds could accumulate and, especially if combined with unused NSP II funds, could be directed toward most effective and efficient initiatives.

There are also disadvantages to a pooling mechanism including administrative complexity of multiple financial transactions between hospitals and the program administrator. Another issue is how to handle the transition between the current funding mechanism and a pooling mechanism, since it would take several months to accumulate funds in a pool before disbursements could be made. Another important consideration is that hospital industry feedback indicates lack of support for a pooled NSP I fund.

Another option discussed was to cease the NSP I program as currently designed at the end of this transition year, FY 2007, and reconstitute a newly organized NSP III program, which includes elements of both the current NSP I and NSP II programs, in FY 2009 with pooled funds, one administrator, and a uniform reporting and evaluation process. The advantage of this option would be a more unified nurse support program directed at most effective initiatives, consistent administration, and accountability.

VIII. Proposed NSP I program revisions

Staff recommends revisions to the NSP I program in the following areas:

- 1. Redefine categories of initiatives eligible for funding;
- 2. Establish categories of initiatives not eligible for funding;
- 3. Revise the RFP process for grant funding to a simplified application process
- 4. Revise the review and evaluation process for initiative approvals and renewals;
- 5. Ongoing review of the funding mechanism; and
- 6. Standardize quantitative annual reports to include:
 - a. Uniform financial reporting (Table I); and
 - b. Uniform annual data reporting requirements (Table II).

1. Redefine categories of initiatives eligible for funding

HSCRC staff recommend that the following categories of initiatives be given priority for funding:

- a. <u>Educational Attainment</u>- This category includes all initiatives involving improved educational qualifications for nurses (RNs and LPNs) as well as initiatives to produce more nurses. All programs providing tuition, stipends, or release time for pursuit of additional education or qualifications apply under this category. Eligibility, funding amounts, and service commitments for scholarships should be consistent with those under the NSP II Statewide Initiatives. Requests for funding for software and hardware specifically dedicated for use in nursing education will be considered on an individual basis.
- b. <u>Nurse Retention and Recruitment</u>- This category applies to all initiatives involving retention of nurses, such as mentoring, internships, residencies, and other support for new graduates and new hires as well as all initiatives involving recruitment including nurse shadowing programs, externships, and summer employment for prospective nursing students. International recruitment of nurses is not encouraged as a primary strategy.
- c. <u>Improved Nurse Practice Environment</u> This category applies to all initiatives to improve nurse practice environment including working on or achieving Magnet Status, joint governance, and other initiatives to improve nurse practice environment.

For those healthcare organizations who do not plan, at this time, to work on achieving Magnet Status, projects related to the components of Magnet Status, or "Forces of Magnetism" such as implementation of professional standards of nursing practice, a nursing quality indicator program, or applied nursing research are included in this category.

Other examples include:

Programs to develop new approaches to staffing, scheduling and allocation of patient care resources.

d. Other Creative Initiatives

Proposals for other creative initiatives to increase the number of bedside nurses will be considered provided that, as required with all applications, the goals and objectives are clearly defined, evaluation metrics are identified, and budget requests fall within the defined NSP I parameters.

These initiatives might include projects that require outside expertise that could be shared, such as the Project LINC and the Nurse Managers Leadership Institute, previously funded in part by NSP I.

2. <u>Categories of Initiatives not eligible for funding</u>

Since it is not the intent of NSP I to fund existing programs that are more appropriately funded through employee fringe benefit programs or to duplicate what is available in rates for traditional hospital-based services or operations, HSCRC staff recommend the exclusion of certain types of activities that have been funded in the initial five-year period.

a. Nurse Retention and Recruitment

Exclusions related to retention and recruitment include:

- Entertainment or parties
- Nursing retention bonuses

- Paid sabbaticals or leave
- Nursing salary increases
- Capital projects
- International recruitment, except as noted below.

In order for a program based on international recruitment of nurses to be eligible for consideration for NSP I program funding, an applicant with prior international recruitment experience must provide outcome data from prior funding years on the number and percentage of international nurses meeting licensure and service commitments after one and two years, as well as turnover rates for the entire nursing service for the same time periods. Applicants with no experience with international recruitment must include a plan for support, retention and tracking of licensure and service completion for all nurses recruited through the new program, and outcome data as they become available. The program should include a plan to phase out international recruitment as nursing capacity improves. These data will be used by the evaluation committee to make decisions about funding or renewing a program application.

b. Non-nursing and non-professional staff education and development

Exclusions related to non-nursing and non-professional staff education and development include:

- Education for radiology and laboratory technicians, ultrasonographers and other non-nursing allied professions;
- Education for non-nursing, non-clinical staff, such as transporters or housekeeping staff, in English as a Second Language, basic math and science courses, and GED preparation.

3. <u>Revised Application Process</u>

During the initial years of NSP I, a formal RFP process was used to solicit proposals for review by an evaluation committee. In more recent years, NSP I grant applicants often provided a

letter to HSCRC staff requesting extensions, changes and additions to their original proposal. Many hospital grant applicants found writing a formal narrative proposal a time-consuming and challenging task. HSCRC staff believe that a formal RFP process is not necessary for evaluation of the non-competitive NSP I grant requests.

Therefore, HSCRC staff recommends that the RFP process be streamlined and simplified into an application process. HSCRC staff recommends that the <u>Nurse Support Program I Application for Funds</u> with the accompanying Instructions for Completion of the NSP I Grant Application, developed with industry input, be implemented as the new application for a NSP I grant.

4. Revised Review and Evaluation process for initiative approvals and renewals

While HSCRC staff initially recommended that one Evaluation Committee be constituted to review proposals for new initiatives and renewals for both the NSP I and NSP II programs in order to develop depth of knowledge about the two programs, improve consistency of evaluation, and provide for better coordination and synergy between the goals of initiatives of both programs, industry feedback indicated that a separate NSP I Evaluation Committee was preferred at this time.

Therefore, HSCRC staff recommends that an independent NSP I Evaluation Committee comprised of representatives from HSCRC staff, the Maryland Hospital Association, the Maryland Higher Education Commission, the hospital, nursing leadership, payers, nursing recruiters, and human resources professionals will review applications meeting the minimum requirements outlined in the application form. Evaluation Committee recommendations for NSP I initiative funding will be provided to the Commission for final approval.

The evaluation criteria utilized by the Evaluation Committee will be updated to reflect the new guidelines for categories of initiatives eligible for funding and objective evaluation metrics required in annual reporting.

5. Funding Mechanism

Due to the disadvantages of instituting pooled funding for NSP I, HSCRC staff recommend continuation of the current funding approach for a second five-year funding cycle at this time. However, staff also recommend ongoing evaluation of the funding approach. As more nursing research and better Maryland NSP I program data become available, funding mechanisms that support the most effective and efficient initiatives should be reconsidered.

6. <u>Standardized quantitative annual reports</u>

HSCRC staff recommends that the hospitals with NSP I program funding be required to provide to HSCRC standardized quantitative annual reports to include:

- a. Uniform financial reporting (Table I); and
- b. Uniform annual data reporting requirements (Table II) These new report forms include objective metrics, should simplify the hospital's report preparation, and provide uniform metrics for program evaluation and accountability.

IX. Summary of Recommendations and timeline

The following is a summary of HSCRC staff recommendations regarding updating the NSP I program guidelines and requirements:

1. Redefined categories of initiatives eligible for funding

HSCRC staff recommend that the following categories of initiatives be given priority for funding:

a. Educational Attainment- All initiatives involving improved educational qualifications for nurses (RNs and LPNs) as well as initiatives to produce more nurses. All programs providing tuition, stipends, or release time for pursuit of additional education or qualifications apply under this category. Eligibility and service commitments for scholarships should be consistent with those under the NSP II Statewide Initiatives. Requests for funding for software and hardware specifically dedicated to use in nursing education will be considered on an individual basis.

- b. <u>Nurse Retention and Recruitment</u>- Applies to all initiatives involving retention of nurses, such as mentoring, internships, residencies, and other support for new graduates and new hires as well as all initiatives involving recruitment including nurse shadowing programs, externships and summer employment for prospective nursing students. International recruitment of nurses is not encouraged as a primary strategy.
- c. <u>Improved Nurse Practice Environment</u> Applies to all initiatives to improve nurse practice environment including working on or achieving Magnet Status, joint governance and other programs to improve initiatives to improve nurse practice environment.

 For those healthcare organizations who do not plan, at this time, to work on achieving Magnet Status, projects related to the components of Magnet Status, or "Forces of Magnetism" such as implementation of professional standards of nursing practice, a nursing quality indicator program, or applied nursing research are included in this category.

Other examples include:

Programs to develop new approaches to staffing, scheduling and allocation of patient care resources.

d. Other Creative Initiatives

Proposals for other creative initiatives to increase the number of bedside nurses will be considered provided that, as required in all applications, the goals and objectives are clearly defined, evaluation metrics are identified, and budget requests fall within the defined NSP I parameters.

Other examples include:

Programs to develop new approaches to staffing, scheduling and allocation of patient care resources.

2. <u>Categories of Initiatives not eligible for funding</u>

HSCRC staff recommend the exclusion of certain types of activities that have been funded in the initial five-year period.

a. Nurse Retention and Recruitment

Exclusion of:

- Entertainment or parties
- Nursing retention bonuses
- Paid sabbaticals or leave
- Nursing salary increases
- Capital projects
- International recruitment, with the exceptions noted in section VI.
- b. Non- nursing and non-professional staff education and development

Exclusion of:

- Education for radiology and laboratory technicians, ultrasonographers and other non-nursing allied professions; and
- Education for non-clinical staff, such as transporters or housekeeping staff, in English as a Second Language, basic math and science courses, and GED preparation.

3. <u>Revised Application Process</u>

HSCRC staff recommends that the RFP process be streamlined and simplified into an application process. HSCRC staff recommends that the <u>Nurse Support Program I Application for Funds</u> with <u>Instructions for Completion of the NSP I Grant Application</u> (attached), developed with industry input, be implemented as the new application for a NSP I grant.

4. Revised Review and Evaluation process for initiative approvals and renewals

HSCRC staff recommends that an independent NSP I Evaluation Committee comprised of representatives from HSCRC staff, the hospital, nursing leadership, payers, nursing recruiters, the Maryland Hospital Association, the Maryland

Higher Education Commission, and human resources professionals will review applications meeting the minimum requirements outlined in the application form. Evaluation Committee recommendations regarding NSP I initiative funding will be provided to the Commission for final approval.

The evaluation criteria utilized by the Evaluation Committee will be updated to reflect the new guidelines for categories of initiatives eligible for funding and objective evaluation metrics required in annual reporting.

5. Funding Mechanism

HSCRC staff recommends continuation of the current funding approach for a second five-year cycle at this time. However, staff also recommends ongoing evaluation of the funding approach. As more nursing research and better Maryland NSP I program data become available, funding mechanisms that support the most effective and efficient initiatives should be reconsidered.

6. Standardized reporting

HSCRC staff recommends that the hospitals with NSP I program funding be required to provide to HSCRC standardized quantitative annual reports_to include:

- Uniform financial reporting (Table I); and
- Uniform annual data reporting requirements (Table II)

A timeline of activities to be completed during the FY 2007 transition year is attached.